

Serial No. 09/919,192  
Amdt. Dated March 17, 2005  
Reply to Office Action of January 4, 2005

### **REMARKS/ARGUMENTS**

Prior to this Amendment, claims 1-12 and 17-20 were pending in this application.

Independent claim 7 is amended to include the limitations of dependent claims 8 and 12, which are canceled, to further distinguish the claimed invention from the cited references.

Claims 1-7, 9-11, and 17-20 remain in the application for consideration by the Examiner.

### **Rejections of Claims Under 35 U.S.C. §102**

In the January 4, 2005 Office Action, claims 7-8, 11-12, and 17-20 were rejected under 35 U.S.C. §102(e) as being anticipated by U.S. Pat. No. 6,584,499 ("Jantz"). This rejection is traversed based on the amendments to independent claim 7 and the following remarks.

As amended, claim 7 is directed to a method for remotely reconfiguring a data storage system that includes: monitoring the client data storage system, based on such monitoring transmitting a recommended reconfiguration for a monitored master storage unit, receiving a reconfiguration request, in response to the request determining the first configuration of the master storage unit, and then transferring a logical implementation for executing to reconfigure the master storage unit that is generated based on the reconfiguration request, the first configuration, and the results of the monitoring. Jantz fails to teach or even suggest each of these elements of the method of claim 7, and hence, Applicants request that the rejection of claim 7 based on Jantz be withdrawn.

More particularly, the Office Action cites Jantz in para. 4 for teaching at col. 2, lines 12-27 for teaching receiving a reconfiguration request and determining a first configuration of a master storage unit. However, at this citation, Jantz discusses selecting a managed device to be configured and issuing configuration change command. Jantz fails to discuss here or elsewhere receiving a

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reconfiguration request or, in response, determining the first configuration of the master storage unit. For this reason alone, claim 7 is not anticipated by Jantz.

Further, the Office Action cites Jantz in para. 6 for teaching at col. 2, lines 42-67 for teaching transmitting a recommended reconfiguration for a storage unit based on monitoring of the storage system. Jantz at this citation teaches invoking a management station to monitor and manage a managed device but fails to teach transmitting a recommended reconfiguration based on the monitoring. Instead, Jantz beginning at col. 17, line 44 discusses the actions a user takes to change the configuration of the managed devices in a network, and this description fails to suggest that a recommended reconfiguration is provided based on monitoring but instead teaches passing a change request to each controller of a managed device to change its configuration when initiated by a user. Hence, Jantz fails to teach or suggest the concept of first recommending a reconfiguration based on monitoring. For this additional reason, claim 7 is not anticipated by Jantz.

Yet further, claim 7 calls for the transferred logical implementation to be executed to reconfigure a storage unit to be "generated based on the reconfiguration request, the first configuration, and results of the monitoring." As discussed above, Jantz fails to teach receiving a reconfiguration request and therefore, cannot teach generating a reconfiguration logical implementation based on such a request. Further, Jantz fails to teach that its configuration change requests are generated based on a combination of the first configuration and monitoring results. Hence, claim 7 is not anticipated by Jantz for this additional reason.

Claim 11 depends from claim 7 and is believed allowable over Jantz as depending from an allowable base claim.

Referring to claim 17, this claim is directed to a method of remotely reconfiguring a data storage system. The method of claim 17 calls for a reconfiguration system to receive a reconfiguration request, to determine a first configuration of a data storage system associated with the request, to identify a "level of configuration services" for the data storage system, and to define a logical

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implementation for the data storage system based on the identified level of service and based on the first configuration. The logical implementation is then transferred to the storage management host installed on the data storage system and executed to reconfigure master storage unit. Jantz at least fails to show defining a logical implementation based on an identified level of service and on a first configuration.

The term "level of service" is defined in Applicants specification at least in the paragraph beginning at page 15, line 12, and the use of such levels of services to determine/define how a system is to be reconfigured is not taught or suggested by Jantz.

Before turning to the "level of service" distinction, it should be understood that claim 17 includes several of the limitation of claim 7 including receiving a reconfiguration request) and defining a logical implementation based on a first configuration. As discussed with reference to claim 7, Jantz fails to teach or suggest these two limitations and hence, the rejection of claim 17 based on Jantz is not supported and should be withdrawn.

Further, the Office Action cites Jantz at col. 21, lines 25-42 for teaching determining the level of reconfiguration services from a plurality of service levels options with its discussion of "identifying software version." However, in the cited text, Jantz is merely discussing whether the software on the managed device is of the correct version to "perform a particular configuration update." Jantz is not teaching determining what level of service an operator of a storage system expects based on the level of service option they have selected. Claim 17 calls for the level of service to be determined AND for this level of service to be used to define a logical implementation of a reconfiguration. Jantz fails to teach either determining the level of service of a storage system or defining a reconfiguration based on such a level of service (the software version check is simply used to determine whether a new installation software version needs to be installed and not to define reconfiguration of the affected storage/managed device). For this additional reason, claim 17 is believed allowable over the teaching of Jantz.

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Further, the Office Action at para. 19 with regard to dependent claim 9 admits that Jantz "fails to show a method including identifying a predetermined level of reconfiguration services from a plurality of service level options and creating the logical implementation based on the identified level of reconfiguration services." Applicant agrees with this assessment and believes claim 17 is allowable over Jantz.

Claims 18-20 depend from claim 17 and are believed allowable for at the reasons provided for allowing claim 17. Claim 18 further defines what is meant by "service level options". The Office Action cites Jantz at col. 5, lines 12-23 for teaching this limitation but at this citation, Jantz is merely discussing that the system of devices shown in Figure 1 of Jantz is an exemplary "configuration" of a storage system and is not discussing service level options. Applicants could find no discussion in Jantz of varying levels of service and thus, of differing reconfiguration logical implementations and clearly no discussion of the options defined in claim 18. Claim 20 calls for issuing a recommended reconfiguration based on monitoring and as discussed with reference to claim 7, this feature of the claimed invention is not shown by Jantz (at the cited col. 2, lines 42-67 or elsewhere in Jantz). For these additional reasons, claims 18 and 20 are believed allowable in light of the teaching of Jantz.

#### **Rejections of Claims Under 35 U.S.C. §103**

Additionally, in the January 4, 2005 Office Action, claims 1, 4, 5, 9, and 10 were rejected under 35 U.S.C. §103(a) as being unpatentable over Jantz in view of U.S. Pat. No. 6,009,466 ("Axberg"). This rejection is traversed based on the following remarks.

Claim 1 is directed to a remote configuration computer system that includes a storage management host installed in a client data storage system. The data storage system has a first configuration and the storage management host provides remote access and a communication link to the master storage unit and host of the data storage system. The system further comprises a reconfiguration center

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located remote to the storage management system. The reconfiguration center **receives a reconfiguration request and in response transfers a logical implementation "selected or created based on the reconfiguration request and the first configuration" to the client data storage system "via the storage management host."** The combination of Jantz and Axberg fails to teach or suggest a system for remotely reconfiguring a data storage system as called for in claim 1, and Applicants request that this rejection be withdrawn.

As with claim 7, claim 1 calls for the remote reconfiguration center to receive a reconfiguration request. As discussed with reference to claim 7, Jantz fails to teach this limitation, and Applicants could find no teaching at col. 15, lines 5-18 or in the Jantz figures that its "I/O Management Station" receives a reconfiguration request. At col. 15, Jantz teaches that "when a user wishes", i.e., when an operator of the I/O Management Station 120 wishes, to manage the system including managed devices the user utilizes discover monitor applets that are transferred to managed devices or client elements. There is no discussion of any of the managed devices or the client system requesting reconfiguration but instead this decision is made by an operator of management stations. For at least this reason, claim 1 is not shown or suggested by Jantz.

Further, claim 1 requires that the logical implementation is "selected or created based on the reconfiguration request and the first configuration." As discussed above, Jantz fails to teach receiving a reconfiguration request so cannot teach selecting or creating a logical implementation based on such a request. The logical implementation also is based on the first configuration. Jantz provides no teaching that it is useful or desirable to select or create a logical implementation defining a second configuration based on the first or existing configuration. For these additional reasons, Jantz fails to teach or suggest all of the limitations of claim 1, and claim 1 is believed allowable over Jantz. Further, Axberg is cited only for teaching a data storage subsystem and not for overcoming these detailed deficiencies in Jantz. Hence, the combination of Jantz and Axberg does not

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support a rejection of claim 1, and Applicants request that the rejection be withdrawn.

Claims 4 and 5 depend from claim 1 and are believed allowable for at least the reasons for allowing claim 1.

Claim 9 calls for determining a level of reconfiguration services and creating the logical implementation based on the identified level. As discussed thoroughly with respect to claim 17, Jantz fails to teach or suggest the utilization of levels of service with regard to generating reconfiguration logical implementations. Axberg is cited at col. 2., line 47 to col. 3, line 22 for providing the teaching missing from Jantz. However, Axberg at this citation is discussing a step-by-step process of configuring a devices in an information processing network but provides no discussion that such a process should be performed based on a determined level of service (such as defined in Applicants' specification) for the network. Hence, Axberg fails to overcome the deficiencies of Jantz. Claim 10 is similar to claim 18, and the reasons for allowing claim 18 over Jantz are applicable to claim 10. For these additional reasons, Jantz and Axberg fail to teach the methods of claims 9 and 10.

Yet further, the January 4, 2005 Office Action rejected claims 2 and 3 under 35 U.S.C. §103(a) based on Jantz in view of Axberg and further in view of U.S. Pat. No. 5,151,895 ("Vacon"). Claims 2 and 3 depend from claim 1 and are believed allowable as depending from an allowable base claim. Further, Vacon fails to overcome the deficiencies discussed above with reference to claim 1.

The Office Action also rejected claim 6 under 35 U.S.C. §103(a) as being unpatentable over Jantz in view of Axberg and further in view of Official Notice. Claim 6 depends from claim 1 and is believed allowable as depending form an allowable based claim.

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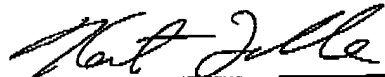
### Conclusions

No fee is believed due for this submittal. However, any fee deficiency associated with this submittal may be charged to Deposit Account No. 50-1123.

Applicants request that a timely Notice of Allowance be issued in this case.

Respectfully submitted,

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